



# **COMMONWEALTH of VIRGINIA**

Douglas W. Domenech  
Secretary of Natural Resources

## **DEPARTMENT OF ENVIRONMENTAL QUALITY**

### **Blue Ridge Regional Office**

[www.deq.virginia.gov](http://www.deq.virginia.gov)

#### **Lynchburg Office**

7705 Timberlake Road  
Lynchburg, Virginia 24502  
(434) 582-5120  
Fax (434) 582-5125

David K. Paylor  
Director

Robert J. Weld  
Regional Director

#### **Roanoke Office**

3019 Peters Creek Road  
Roanoke, Virginia 24019  
(540) 562-6700  
Fax (540) 562-6725

## **STATIONARY SOURCE PERMIT TO MODIFY AND OPERATE and STATIONARY SOURCE PERMIT TO OPERATE**

This permit supersedes your permit dated September 25, 2002.

In compliance with the Federal Clean Air Act and the Commonwealth of Virginia  
Regulations for the Control and Abatement of Air Pollution,

Delta Star Incorporated  
3550 Mayflower Drive  
Lynchburg, Virginia 24501  
Registration No.: 30239

is authorized to modify and operate

a medium power transformer and industrial products manufacturing facility

located at

3550 Mayflower Drive  
Lynchburg, Virginia

in accordance with the Conditions of this permit.

Approved on <<Date>>.

Robert J. Weld  
Regional Director

Permit consists of 8 pages.  
Permit Conditions 1 to 21.

## **INTRODUCTION**

This permit approval is based on the permit application dated May 4, 2002, including amendment information dated June 4, 2002 and application dated July 14, 2011, including amendment information dated July 28, 2011, August 12, 2011, August 25, 2011, August 26, 2011, and September 12, 2011. Any changes in the permit application specifications or any existing facilities which alter the impact of the facility on air quality may require a permit. Failure to obtain such a permit prior to construction may result in enforcement action. In addition, this facility may be subject to additional applicable requirements not listed in this permit.

Words or terms used in this permit shall have meanings as provided in 9 VAC 5-10-20 of the State Air Pollution Control Board Regulations for the Control and Abatement of Air Pollution. The regulatory reference or authority for each condition is listed in parentheses () after each condition.

Annual requirements to fulfill legal obligations to maintain current stationary source emissions data will necessitate a prompt response by the permittee to requests by the DEQ or the Board for information to include, as appropriate: process and production data; changes in control equipment; and operating schedules. Such requests for information from the DEQ will either be in writing or by personal contact.

The availability of information submitted to the DEQ or the Board will be governed by applicable provisions of the Freedom of Information Act, §§ 2.2-3700 through 2.2-3714 of the Code of Virginia, § 10.1-1314 (addressing information provided to the Board) of the Code of Virginia, and 9 VAC 5-170-60 of the State Air Pollution Control Board Regulations. Information provided to federal officials is subject to appropriate federal law and regulations governing confidentiality of such information.

## **PROCESS REQUIREMENTS**

1. **Equipment List** - Equipment at this facility consists of the following:

| <b>Equipment to be Constructed</b> |   |                       |
|------------------------------------|---|-----------------------|
| <b>Reference No.</b>               | <b>Equipment Description</b>                                | <b>Rated Capacity</b> |
| PB3                                | One spray booth for transformer coating with two spray guns | 8.4 gal/hr/spray gun  |

| <b>Equipment to be Modified</b> |   |                       |
|---------------------------------|---|-----------------------|
| <b>Reference No.</b>            | <b>Equipment Description</b>                                | <b>Rated Capacity</b> |
| PB1                             | One spray booth for transformer coating with two spray guns | 8.4 gal/hr/spray gun  |
| PB2                             | One spray booth for transformer coating with two spray guns | 8.4 gal/hr/spray gun  |
| Paint Line                      | One spray booth for small parts coating with two spray guns | 8.4 gal/hr/spray gun  |

Specifications included in the permit under this Condition are for informational purposes only and do not form enforceable terms or conditions of the permit.  
(9 VAC 80-1180 D 3 and 9 VAC 5-80-850)

2. **Emission Controls** - Particulate emissions from the spray booths (PB1, PB2, PB3, and Paint Line) shall be controlled by enclosure and venting through fiber filters. The fiber filters shall be provided with adequate access for inspection and shall be in operation when the spray booth is operating.  
(9 VAC 5-80-1180, 9 VAC 5-80-850, and 9 VAC 5-50-260)
3. **Emission Controls** - VOC emissions from cleaning or purging operations shall be minimized by use of detergents or use of high pressure water or use of non-volatile compounds or reduced use of volatile organic compounds or adjustment of production schedules to minimize coating changes.  
(9 VAC 5-80-1180, 9 VAC 5-80-850, and 9 VAC 5-50-260)
4. **VOC Work Practice Standards** - At all times the disposal of volatile organic compounds shall be accomplished by taking measures, to the extent practicable, consistent with air pollution control practices for minimizing emissions. Volatile organic compounds shall not be intentionally spilled, discarded in sewers which are not connected to a treatment plant, or stored in open containers, or handled in any other manner that would result in evaporation beyond that consistent with air pollution practices for minimizing emissions.  
(9 VAC 5-80-850 and 9 VAC 5-80-1180)
5. **Monitoring Devices** - The spray booths (PB1, PB2, PB3, and Paint Line) shall be equipped with devices to continuously measure the differential pressure drop across the spray booth exhaust filters. Each monitoring device shall be installed, maintained, calibrated and operated in accordance with approved procedures which shall include, as a minimum, the manufacturer's written requirements or recommendations. Each monitoring device shall be provided with adequate access for inspection and shall be in operation when the spray booths are operating.  
(9 VAC 5-80-850 and 9 VAC 5-80-1180 D)
6. **Monitoring Device Observation** - To ensure good performance, the monitoring device used to continuously measure differential pressure across the filters shall be observed by the permittee with a frequency of not less than once per day. The permittee shall keep a log of the observations from the differential pressure monitoring devices.  
(9 VAC 5-80-850 and 9 VAC 5-80-1180 D)

### **EMISSION LIMITS**

7. **Process Emission Limits** - Emissions from the operation of each of the spray Booths (PB1, PB2, PB3, and Paint Line) shall not exceed the limits specified below:

Particulate Matter (PM) 14.9 lb/hr

PM-10 14.9 lb/hr

(9 VAC 5-80-1180, 9 VAC 5-50-260, and 9 VAC 5-80-850)

8. **Process Emission Limits** - Emissions from the operation of spray Booths (PB1, PB2, PB3, and Paint Line) shall not exceed the limits specified below:

Particulate Matter (PM) 9.7 tons/yr

PM-10 9.7 tons/yr

Volatile Organic Compounds 3.5 pounds<sub>VOC</sub> per gallon as applied as a monthly average 30 tons/yr

Annual emissions calculated as the sum of each consecutive 12 month period.

These emissions are derived from the estimated overall emission contribution from operating limits. Exceedance of the operating limits may be considered credible evidence of the exceedance of emission limits. Compliance with these emission limits may be determined as stated in Condition 11.

(9 VAC 5-80-1180, 9 VAC 5-50-260, and 9 VAC 5-80-850)

9. **Emission Limits** - Hazardous air pollutant (HAP) emissions, as defined by §112(b) of the Clean Air Act, from the facility shall be less than 10 tons per year of any individual HAP and 25 tons per year of any combination, calculated monthly as the sum of each consecutive 12 month period.  
(9 VAC 5-80-850)

10. **Visible Emission Limit** - Visible emissions from each spray booth (PB1, PB2, PB3, and Paint Line) exhaust stack shall not exceed 5 percent opacity as determined by the EPA Method 9 (reference 40 CFR 60, Appendix A). This condition applies at all times except during startup, shutdown and malfunction.  
(9 VAC 5-80-1180, 9 VAC 5-50-260, and 9 VAC 5-80-850)

## **RECORDS**

11. **On Site Records** - The permittee shall maintain records of emission data and operating parameters as necessary to demonstrate compliance with this permit. The content and format of such records shall be arranged with the Blue Ridge Regional Office. These records shall include, but are not limited to:

- a. Material Safety Data Sheets (MSDS), Certified Product Data Sheets (CPDS), or other vendor information showing VOC content, toxic compound content, HAP content, water content, and solids content for each coating, thinner, cleaning solution, and solvent clean used.
- b. Monthly and annual PM, PM-10, VOC, and HAPs emissions (in tons) for spray booth emissions, using calculation methods approved by the Blue Ridge Regional Office, to demonstrate compliance with the emissions limitations in Conditions 8 and 9. Compliance for the consecutive 12-month period shall be demonstrated monthly by adding the total for the most recently completed calendar month to the individual monthly totals for the preceding 11 months.
- c. Average monthly VOC content in lbs VOC/gal coating applied from the spray booths to demonstrate compliance with the emissions limitations in Condition 8.
- d. Documentation of VOC content (in pounds/gallon as applied) of each of the coatings used in the spray booths (PB1, PB2, PB3, and Paint Line).
- e. Monitoring records as required in Condition 6.
- f. Scheduled and unscheduled maintenance and operator training.
- g. Records as required in Conditions 16 and 17.

These records shall be available for inspection by the DEQ and shall be current for the most recent five years.

(9 VAC 5-80-1180 and 9 VAC 5-80-850)

## **NOTIFICATIONS**

**12. Initial Notifications** - The permittee shall furnish written notification to the Blue Ridge Regional Office of:

- a. The actual date on which construction of spray booth PB3 commenced within 30 days after such date.
- b. The actual start-up date of spray booth PB3 within 15 days after such date.

(9 VAC 5-50-50, 9 VAC 5-80-1180, and 9 VAC 5-80-850)

## **GENERAL CONDITIONS**

13. **Permit Invalidation** – The portions of permit to construct spray booth PB-3 shall become invalid, unless an extension is granted by the DEQ, if:

- a. A program of continuous modification , reconstruction, or modification is not commenced within the latest of the following:
  - i. 18 months from the date of this permit;
  - ii. Nine months from the date that the last permit or other authorization was issued from any other governmental entity;
  - iii. Nine months from the date of the last resolution of any litigation concerning any such permits or authorization; or
- b. A program of modification, reconstruction, or modification is discontinued for a period of 18 months or more, or is not completed within a reasonable time, except for a DEQ approved period between phases of a phased construction project.

(9 VAC 5-80-1210 and 9 VAC 5-80-850)

14. **Permit Suspension/Revocation** - This permit may be suspended or revoked if the permittee:

- a. Knowingly makes material misstatements in the permit application or any amendments to it;
- b. Fails to comply with the conditions of this permit;
- c. Fails to comply with any emission standards applicable to a permitted emissions unit;
- d. Causes emissions from the stationary source which result in violations of, or interfere with the attainment and maintenance of, any ambient air quality standard; or
- e. Fails to operate in conformance with any applicable control strategy, including any emission standards or emission limitations, in the State Implementation Plan in effect at the time an application for this permit is submitted.

(9 VAC 5-80-1210 F and 9 VAC 5-80-850)

15. **Right of Entry** - The permittee shall allow authorized local, state, and federal representatives, upon the presentation of credentials:

- a. To enter upon the permittee's premises on which the facility is located or in which any records are required to be kept under the terms and conditions of this permit;

- b. To have access to and copy at reasonable times any records required to be kept under the terms and conditions of this permit or the State Air Pollution Control Board Regulations;
- c. To inspect at reasonable times any facility, equipment, or process subject to the terms and conditions of this permit or the State Air Pollution Control Board Regulations; and
- d. To sample or test at reasonable times.

For purposes of this condition, the time for inspection shall be deemed reasonable during regular business hours or whenever the facility is in operation. Nothing contained herein shall make an inspection time unreasonable during an emergency.  
(9 VAC 5-170-130, 9 VAC 5-80-1180, and 9 VAC 5-80-850)

- 16. Maintenance/Operating Procedures** – At all times, including periods of start-up, shutdown, and malfunction, the permittee shall, to the extent practicable, maintain and operate the affected source, including associated air pollution control equipment, in a manner consistent with good air pollution control practices for minimizing emissions.

The permittee shall take the following measures in order to minimize the duration and frequency of excess emissions, with respect to air pollution control equipment and process equipment which affect such emissions:

- a. Develop a maintenance schedule and maintain records of all scheduled and non-scheduled maintenance.
- b. Maintain an inventory of spare parts.
- c. Have available written operating procedures for equipment. These procedures shall be based on the manufacturer's recommendations, at a minimum.
- d. Train operators in the proper operation of all such equipment and familiarize the operators with the written operating procedures, prior to their first operation of such equipment. The permittee shall maintain records of the training provided including the names of trainees, the date of training and the nature of the training.

Records of maintenance and training shall be maintained on site for a period of five years and shall be made available to DEQ personnel upon request.  
(9 VAC 5-50-20 E, 9 VAC 5-80-1180 D, and 9 VAC 5-80-850)

- 17. Record of Malfunctions** – The permittee shall maintain records of the occurrence and duration of any bypass, malfunction, shutdown or failure of the facility or its associated air pollution control equipment that results in excess emissions for more than one hour. Records shall include the date, time, duration, description (emission unit, pollutant affected, cause), corrective action, preventive measures taken and name of person generating the record.

(9VAC 5-20-180 J, 9 VAC 5-80-1180 D, and 9 VAC 5-80-850)

18. **Notification for Facility or Control Equipment Malfunction** - The permittee shall furnish notification to the Blue Ridge Regional Office of malfunctions of the affected facility or related air pollution control equipment that may cause excess emissions for more than one hour, by facsimile transmission, telephone or telegraph. Such notification shall be made as soon as practicable but no later than four daytime business hours after the malfunction is discovered. The permittee shall provide a written statement giving all pertinent facts, including the estimated duration of the breakdown, within two weeks of discovery of the malfunction. When the condition causing the failure or malfunction has been corrected and the equipment is again in operation, the permittee shall notify the Blue Ridge Regional Office.

(9 VAC 5-20-180 C, 9 VAC 5-80-1180, and 9 VAC 5-80-850)

19. **Violation of Ambient Air Quality Standard** - The permittee shall, upon request of the DEQ, reduce the level of operation or shut down a facility, as necessary to avoid violating any primary ambient air quality standard and shall not return to normal operation until such time as the ambient air quality standard will not be violated.

(9 VAC 5-20-180 I, 9 VAC 5-80-1180, and 9 VAC 5-80-850)

20. **Change of Ownership** - In the case of a transfer of ownership of a stationary source, the new owner shall abide by any current permit issued to the previous owner. The new owner shall notify the Blue Ridge Regional Office of the change of ownership within 30 days of the transfer.

(9 VAC 5-80-1240 and 9 VAC 5-80-850)

21. **Permit Copy** - The permittee shall keep a copy of this permit on the premises of the facility to which it applies.

(9 VAC 5-80-1180 and 9 VAC 5-80-850)